1 Q. Please state your name, business address and position with PacifiCorp.

2 A. My name is Rodger Weaver. My business address is 825 NE Multnomah, Suite
3 800, Portland, Oregon 97232. My present position is Director, Regulatory
4 Projects.

5 **Qualifications**

6 Q. Briefly describe your educational and professional background.

7 A. I received an undergraduate degree in Economics and a Ph.D. in Economics from
8 the University of Utah. I worked for the Public Service Commission of Utah
9 from 1984-1987 as a Senior Economist, and the Utah Division of Public Utilities
10 from 1987-1992 as a Senior Economist. In 1992, I began working for PacifiCorp
11 and assumed my current title and duties in 2001. I am responsible for directing
12 the management of all Regulation Department projects.

13 **Purpose of Testimony**

14 Q. What is the purpose of your testimony?

15 A. The primary purpose of my testimony is to support the Company's application for
16 approval of the Interim Power Cost Adjustment Mechanism (PCAM) set out in
17 Exhibit B of the Application. PacifiCorp proposes that this Interim PCAM be
18 implemented as soon as practicable while the longer-term aspects of the
19 Application are addressed. The PCAM, if authorized by the Commission, would
20 assure the tracking and reflection in rates of variations in net power costs
21 experienced by the Company. My second purpose is to place the Interim PCAM
22 in the context of the Company's request for new guidelines addressing IRP,
23 power supply risk management, wholesale transactions, and a longer-term PCAM.

1 Q. What is the organization of your testimony?

2 A. I will first address my second purpose and provide details on the current practices
3 of the Company and the wholesale market environment. Then, in light of the
4 Company's efforts to minimize risk, I will discuss the need to develop new
5 guidelines for integrated resource planning (IRP), power cost risk management,
6 and wholesale transactions, with all interested stakeholders. Finally, with this
7 background, I will then turn to my primary purpose, a description of and support
8 for, the requested interim PCAM mechanism.

9 **Current Situation**

10 Q. Please describe the significance of net power costs in relation to PacifiCorp's total
11 cost of service.

12 A. The level of net power costs (NPC) currently reflected in rates is somewhat
13 difficult to determine inasmuch as the last rate case in Idaho in which the
14 Company's net power costs were addressed was prior to the Utah Power/Pacific
15 Power merger. For this reason and based on conversations with the Commission
16 Staff, the Company is proposing in CASE NO. PAC-E-02-1 to use the last audited
17 net power cost study for a semi-annual filing for the purpose of calculating
18 deferred excess net power costs. Mark Widmer's PacifiCorp Exhibit No. 4 in that
19 filing shows Type III normalized NPC for 1999 as $453.6 million. The
20 corresponding total Company "revenue requirement" at 11.5 percent ROE from
21 that semi-annual study was $2.46 billion. Thus, NPC constituted 18.4 percent of
22 total Company revenue requirement in that study.

23 Q. Please describe PacifiCorp Exhibit No. 1.

1 A. Exhibit No. 1 illustrates price volatility in the Western electricity market prices.
2 It shows the average monthly wholesale prices for the 24-month period ended
3 November 2001 for the five major Dow Jones reported liquid hubs, California-
4 Oregon Border (COB), Mid-Columbia (Mid-C), Palo Verde (PV), Four Corners
5 (4C), and the California PX (CalPX). The Company operates in all of these
6 markets. This Exhibit gives a visual view of the wholesale market in recent
7 months and shows that prices in late 2000 and early 2001 were five to ten times
8 the prices experienced before early 2000. Wholesale market price volatility is
9 expected to continue into the future, sometimes exceeding expectations and
10 sometimes falling below expectations. A PCAM is necessary to address this
11 volatility and unpredictability.
12 Q. What is the purpose of the Company's participation in the wholesale market?
13 A. Wholesale sales and purchases are tools for balancing and optimizing the
14 portfolio of resources used to serve retail customers. A load serving entity, such
15 as PacifiCorp, attempts to plan its requirements long in advance. The Company
16 forecasts retail loads, constructs new generation and enters into wholesale
17 purchase and sale contracts in an attempt to balance forecast loads with forecast
18 resources months and years in advance of "real time" deliveries. To the extent
19 practicable, the Company attempts to limit exposure to high volatility in the short-
20 term market.
21 Q. Is it necessary for a load serving utility to participate in short-term wholesale
22 power markets, notwithstanding its planning efforts?
23 A. Yes. Long-term planning decisions are inevitably imperfect. Hydroelectric

conditions, weather, plant availability and customer usage patterns inevitably vary from expected values and frequently by significant amounts. Until the time of delivery, the Company continually evaluates its load and resource balance and optimizes its system to keep net power costs as low as possible.

Q. Do short-term purchases sometimes necessitate short-term sales?

A. Yes, for at least two reasons. First, due to the liquidity of the market for "standard products," at times the Company enters into short-term firm purchases of such products to cover peak load. The "shoulder" hours power of such purchases may be surplus because of the load profile. An example of a standard product in the market is a monthly "Heavy Load Hour" product that provides a "6 x 16" block of deliveries (six days of the week excluding Sunday, for the 16 heavy load hours in the day). To the extent we do not purchase "standard" forward products, we are forced to rely more heavily on the more volatile day ahead and real time markets. Therefore, we may purchase a monthly Heavy Load Hour product as the most economical and lowest-risk means of meeting the 8 hour per day "super-peak" requirements of a future period, with the expectation that we will sell surplus energy in short-term markets for the eight "shoulder" hours of each of those days.

A second reason that short-term purchases can lead to short-term sales relates to the inherently imperfect nature of forecasting such critical elements as the level of retail load, availability of Company's generation resources, and availability of transmission network. For example, there are occasions when the Company purchases energy in anticipation of an expected load level and the

1 expected load does not materialize. One reason for such an event could be that
2 expected extreme weather (cold or hot) does not materialize. Such an occurrence
3 requires us to sell the now-surplus energy into short-term markets.
4 Q. Does the Company balance system requirements with wholesale purchases and
5 sales?
6 A. Yes. As mentioned above, participation in the short-term market is necessary for
7 any utility that must balance its system, since the loads and resources comprising
8 a utility's system can and do vary significantly. The Company has consistently
9 relied on short-term purchases in the wholesale market for a small portion of its
10 overall system requirements. Table 1 below shows that for the years 1996-2001,
11 the Company's net short-term purchases comprised a relatively constant - and
12 small - percentage of the overall system requirements. In the Company's view,
13 this is an appropriate level of reliance on the wholesale markets, and is consistent
14 with using wholesale purchases and sales to optimize resources and balance the
15 Company's system, while not exposing customers to unreasonable market price
16 risk.
17

Table 1
PacifiCorp 1996-2001
Net Short-Term Purchases as a Percentage of System Requirements[1]

Year	System (GWh)	Net Short Term Purchases (GWh)	Percent of System Requirements
1996	62.9	0.9	1.4
1997	66.1	1.8	2.7
1998	68.3	2.3	3.4
1999	67.5	1.7	2.5

2000	68.1	4.5	6.6
2001[2]	57.2	3.5	6.1

[1] System requirements are defined to include only long-term commitments, and exclude short-term sales.
[2] January through November.

Q. What do you conclude from the foregoing?

A. I conclude that despite best efforts to control net power costs, the Company experiences significant volatility in these costs due to factors beyond its control. Most recently, the causes of such volatility include unusually poor hydro conditions, the extended forced outage of the Company's Hunter 1 generating unit, and fluctuation in wholesale market prices. The volatility experienced by the Company requires a mechanism to ensure the Company has the ability to recover prudently incurred net power costs, which will provide the Company with an opportunity to earn a reasonable rate of return.

Q. Is PacifiCorp vulnerable to volatility in hydro conditions in the western electricity markets?

A. Yes. Approximately 11 percent of the Company's firm owned-generation and long-term purchased energy is hydro based.

Q. Does this percentage indicate the full extent of the Company's exposure to hydro volatility?

A. No, for at least two reasons. First, the Company uses its hydro resources to shape its total energy production into the higher valued peak load hours. During periods of low hydro conditions, the Company not only has to purchase or produce more total energy from higher cost resources, it has to do so to cover the highest priced energy demanded by its customers (i.e. "super-peak" power). Thus, the value of

1 the Company's hydro resources is more than proportional to the amount of energy
2 they produce, and vulnerability to hydro volatility is accordingly
3 disproportionately higher. Secondly, wholesale prices and hydro conditions tend
4 to be inversely related. Thus, when hydro production is low, wholesale prices
5 tend to be high, so replacement power is abnormally expensive. PacifiCorp is,
6 indeed, subject to net power cost volatility generated by uncontrollable volatility
7 in hydro conditions.
8 Q. Does price volatility still exist in the wholesale electricity markets, even though
9 FERC imposed price mitigation measures and rule changes in June 2001?
10 A. Yes. Although prices have dropped dramatically since FERC's June 19, 2001
11 Order, there is nothing to prevent high prices and volatility from recurring. In my
12 view, the principal elements that underlie the price and supply circumstances in
13 the wholesale markets – such as natural gas prices, demand for electricity,
14 weather conditions, federal and state legislative and regulatory initiatives, and
15 generation supply – should be expected to produce volatility; sometimes low and
16 sometimes high prices throughout the Western electricity markets. Natural gas
17 prices, for example, are subject to wide fluctuations depending on the supply
18 situation (e.g. whether drilling has kept pace with growing demand related, in
19 part, to natural gas fired generation) and weather conditions affecting residential
20 space heat demand. Rainfall, and the variation in hydro generation between a
21 drought year (such as the 2000-2001 water year) versus a good hydro year (such
22 as 1997), is inherently unpredictable. Periods of extreme weather-related high
23 and low demand will continue to occur on unpredictable schedules, as will other

events that impact demand for electricity. The availability of existing generating units and the number, characteristics and availability of new generating units are other variables that are difficult to predict. Finally, states continue to experiment with direct retail access, federal legislation addressing the electricity industry remains a possibility, and the FERC price cap mechanism is scheduled to expire in September 2002. For these reasons, the Company believes that it will continue to face unpredictability and volatility associated with wholesale electricity markets, and that a PCAM is an appropriate response.

Q. What actions has the Company taken to insulate itself and its customers from this volatility?

A. The Company is able to meet a significant portion of its native load requirements through reliable, company-owned low-cost generation as well as through long-term and medium-term power purchase agreements. These power supply sources reduce the frequency and size of PacifiCorp's short-term and spot market transactions from what they would otherwise be. In addition, the Company engages in integrated resource planning (IRP), which it is revising to make it more compatible with and responsive to current market conditions. These revisions are addressed in the guidelines-setting portion of this case. This IRP process will provide further assurances to the Commission and customers of the prudence of our net power costs involving purchases and/or construction. The Company is also developing new risk management approaches and tools that will reduce the risk faced by the Company and its customers. These efforts further align the interests of shareholders and customers. Finally, in the proposed Interim

1 PCAM, the Company is proposing an 80/20 sharing mechanism. With this
2 sharing, PacifiCorp shareholders will bear 20 percent of the power costs above the
3 baseline, and retain 20 percent of power cost savings when actuals are below the
4 baseline, thereby reinforcing the Company's incentive to manage its system
5 prudently and keep costs low.
6 Q. Please describe power cost risk management and its role in this case.
7 A. Power cost risk management activities are commercial activities intended to
8 mitigate the impacts of unanticipated changes in commodity price, transmission,
9 loads or resource availability. Such activities could include, but are not limited to
10 hedges against weather and availability of the generating resources, financially or
11 physically settled derivatives, and demand side management and forward physical
12 purchases. The Company is actively investigating these opportunities to reduce
13 its risks. The Company believes that the guideline process for IRP, risk
14 management and wholesale transactions, when complete, will provide needed
15 input to the Company reflecting the inputs of all interested stakeholders. At that
16 time, the Commission should adopt the PCAM described in Application Exhibit
17 A. Prior to completion of the new guideline process, the Company believes it
18 would be appropriate for the Commission to adopt the PCAM described in
19 Application Exhibit B.
20 Q. You mentioned that the Company is developing new risk management tools.
21 Please provide an example.
22 A. As mentioned earlier, hydrogeneration output and power prices in the Northwest
23 tend to be inversely related. When hydrogeneration output is lower than expected

(due to low streamflow from dry weather and/or diminished snow melt) prices are high and the NPC tends to increase due to the need to purchase high priced power. When hydrogeneration output is higher than expected (due to high streamflow due to heavy precipitation and/or snow melt) prices are low and the NPC benefit from the sale of surplus power is somewhat diminished. A five-year hydrogeneration hedge to mitigate this exposure has been entered into by PacifiCorp. When streamflow (on average) is significantly lower than normal within PacifiCorp's system, PacifiCorp receives a payment from the counterparty. When streamflow (on average) is significantly higher than normal within PacifiCorp's system, PacifiCorp makes a payment to the counterparty. PacifiCorp pays a relatively small annual premium for this instrument. Our analysis suggests that in dry years (such as those experienced in CY 2000/2001), this risk management instrument will provide significant protection to our ratepayers.

Q. PacifiCorp has proposed a restructuring of the Company under its SRP proposal. Do you believe that the resulting Idaho electric company will justify a PCAM like that proposed here?

A. I believe it will. The Idaho electric company created through SRP (PacifiCorp Idaho, Inc.) will purchase power from PacifiCorp Generation Company under the terms of a contract or contracts. It will also purchase or acquire power from other sources over time. Portions of these purchases will be subject to the types of volatility PacifiCorp currently faces. For example, the total monthly charge to PacifiCorp Idaho, by PacifiCorp Generation will have a fixed cost and a variable cost component. PacifiCorp Idaho will require the same treatment of the volatile

1 components of these contract charges as does PacifiCorp for its current net power
2 cost. The PCAM proposed in this case will doubtless require modification to
3 accommodate the final version of PacifiCorp Idaho's power supply arrangements,
4 but the same kinds of issues must be resolved. Further, as PacifiCorp Idaho adds
5 new resources over time, it will continue to be subject to the kinds of volatility
6 that lead to the current filing.

7 **Guideline Process**

8 Q. What are the nature and purpose of the requested guidelines?

9 A. The electric utility industry has undergone significant evolution since the IRP
10 guidelines under which the Company operates were established. Thus, the current
11 practice of conducting IRP under a relatively long schedule of studies and reports
12 on a two year cycle addressing long lead time construction options is no longer
13 adequately responsive as input to Company decision making. This is a primary
14 reason why the Company seeks to develop with the Commission and other
15 interested parties a new set of guidelines that balance the issues of expected costs
16 of available resource options with the risks associated with adopting any one
17 option. These guidelines should address the Company's wholesale transactions
18 policies and practices as it implements IRP and risk management guidelines to
19 optimize its system for the benefit of its retail customers.

20 Q. Are the new guidelines being established for the current IRP?

21 A. No. On December 12, 2001, the Company commenced a collaborative IRP
22 process and invited the staffs of the public utility commissions that regulate the
23 Company to participate. This IRP process is expected to be completed by

1 December 31, 2002. This IRP process is being carried out in recognition of the
2 necessity to make certain decisions in the near term. The guidelines to be
3 developed in this case, if ultimately adopted by the Commission, will be for
4 subsequent IRP processes.

5 PacifiCorp plans and operates its system on a multi-state integrated basis.
6 PacifiCorp's planning and operation involves considerations of Company-owned
7 generation, forecast generation and demand-side resource costs, wholesale sales
8 and purchase opportunities, transmission capabilities and opportunities, existing
9 load, forecast load, and a variety of other issues. PacifiCorp's resource planning
10 is developed in an IRP process and reported in the Company's resource and
11 market planning program ("RAMPP") reports. However, on a going forward
12 basis, the Company believes that new guidelines should be developed that reflect
13 the current and expected state of the Western electricity markets and be developed
14 with the input of all interested parties.

15 Q. What is the relationship of the desired guidelines to the PCAM portion of the
16 filing?

17 A. The Company recognizes that the other parties might believe that under current
18 guidelines there is more risk of higher-than-expected power costs being incurred
19 by the Company than should be passed on to customers. Thus, the Company does
20 not propose the no-sharing PCAM described in Application Exhibit A until the
21 Commission is satisfied that the guidelines to be adopted in this case are sufficient
22 to limit such risk to acceptable levels. For this reason, the requested Interim
23 PCAM imposes risk-sharing between shareholders and customers. Then, when

1 these new guidelines are established by the Commission and implemented by the
2 Company, the Application requests the adoption of a PCAM without risk-sharing.
3 Q. In summary then, why is the Company proposing a PCAM at this time?
4 A. PacifiCorp is seeking a regulatory mechanism for recovery of its net power costs.
5 Such a recovery mechanism is warranted given the characteristics of net power
6 costs incurred by the Company. These costs represent a large component of
7 PacifiCorp's total operating costs. In addition, a significant portion of them lie
8 primarily outside the Company's control, and are subject to volatility, given the
9 very significant and unpredictable price swings experienced in the wholesale
10 electricity market.
11 **PCAM Description**
12 Q. Can you provide a simple description of the initial phase of the PCAM that
13 PacifiCorp is proposing?
14 A. Yes. The Interim PCAM laid out in Exhibit B of the Application will allow
15 PacifiCorp the ability to recover 80 percent of the Actual Net Power Costs in
16 excess of the baseline and, when Actual Net Power Costs are below the baseline,
17 return to customers 80 percent of the difference. The baseline will be set at the
18 level established in this proceeding. Under the Exhibit B PCAM, 20 percent of
19 power costs above the baseline will be borne by the Company's shareholders and
20 when Actual Net Power Costs are below the baseline, 20 percent of the difference
21 will be retained by shareholders, with the balance returned to customers. The
22 PCAM will also send appropriate price signals to customers regarding the level of
23 power costs incurred by the Company, whether such costs are increasing or

1 declining. With these features, we believe the Interim PCAM is just, reasonable
2 and in the public interest.
3 Q. Other than the sharing mechanism, are there other differences between the Exhibit
4 A and Exhibit B PCAM methods?
5 A. No. Aside from sharing, they are the same.
6 Q. Please describe how the PCAM would operate.
7 A. Under the PCAM, a Net Power Cost Divergence is determined on a monthly basis
8 and is equal to the Actual Net Power Cost less the Base Net Power Cost. In the
9 Interim PCAM, Net Power Cost Divergence is 80 percent of this difference. A
10 Net Power Cost Balancing Account will be established and, at the end of each
11 month, the month's Net Power Cost Divergence will be posted to the Net Power
12 Cost Balancing Account. A positive entry into the account will occur in any
13 month that Actual Net Power Cost exceeds the Base Net Power Cost. A positive
14 balance represents money owed to the Company by its customers. A negative
15 entry will occur when the Actual Net Power Cost is less than the Base Net Power
16 Cost. A negative balance will indicate money owing to customers from the
17 Company.
18 Q. How will Base Net Power Cost be established?
19 A. The Company proposes to begin using the Base Net Power Cost proposed by the
20 Company CASE NO. PAC-E-02-1. Upon completion of that case, the Company
21 proposes to convert to the Base Net Power Cost established in that case. At that
22 time, the Company proposes to also true-up the Net Power Cost Balancing
23 Account based on the final determination in CASE NO. PAC-E-02-1.

1 Q. What is the Company's proposed method for establishing Base Net Power Cost in
2 CASE NO. PAC-E-02-1?
3 A. Base Net Power Cost is intended to represent the level of power costs currently
4 reflected in rates. As described above, the Company has proposed that the last
5 audited net power cost study for a semi-annual filing would be appropriate for use
6 in the deferral calculations. The last audited net power cost study is for the 12-
7 months ended December 31, 1998, and included a Type III study, which
8 incorporated known and measurable changes through December 31, 1999. The
9 Base Net Power Cost is equal to the monthly net power cost, which consists of
10 purchased power, wheeling and fuel expenses less special sales revenue, divided
11 by the monthly net system load in rates. Exhibit No. 2 shows the components and
12 calculation of the Base Net Power Cost. (Exhibit No. 2 is a duplicate of
13 PacifiCorp's Exhibit No. 4 in CASE NO. PAC-E-02-1.)
14 Q. How is the monthly Actual Net Power Cost calculated?
15 A. The Actual Net Power Cost is calculated based on actual monthly net power costs
16 from Company books and records adjusted to exclude energy exchange contracts
17 that only have nominal dollar values for accounting purposes.
18 Q. How will the monthly balancing account entries be computed?
19 A. There will be two types of entry. The first will be the monthly Net Power Cost
20 Divergence, i.e., the difference between Base and Actual Net Power Cost, (80
21 percent of this difference in the interim PCAM) as described above.
22 Q. What is the second type of entry and how is it to be computed?

1 A. The second type of entry is the amortizing entry established to recover for the
2 Company or return to the customers the Net Power Cost Balancing Account
3 balance.
4 Q. How does the Company propose to account for the costs referenced in your
5 testimony?
6 A. Subject to the Commission's approval of the Company's proposed PCAM, the
7 monthly values of the PCAM will be credited to Account 557, thereby decreasing
8 the recorded power supply expenses, and debiting Account 182.3. Deferred
9 income taxes will be recorded by debiting Account 410.10, and crediting Account
10 283. The amortization of the balance in Account 182.3 would be accomplished
11 by crediting Account 182.3 and debiting Account 557. Deferred income taxes
12 would be amortized by debiting Account 283 and crediting Account 411.10.
13 Q. When would the PCAM result in a rate change?
14 A. The Company proposes to accumulate entries into the Net Power Cost Balancing
15 Account until the balance in that account, positive or negative, reaches 2.5 percent
16 of then-current revenues. At that time, the Company will initiate a case to
17 amortize the balance as a bill surcredit or surchage over the following 12 months.
18 Q. Is the Company proposing to accrue carrying charges on its accrued excess net
19 power costs?
20 A. Yes. The Company therefore requests as part of this filing that it be allowed to
21 accrue carryings charges on its deferred net power costs at the 4.0 percent interest
22 rate it pays for customer deposits. The Company believes this request is
23 reasonable because it prudently acquired resources for the benefit of its customers

at a significant cost, which to this time have been borne by the Company's shareholders. This proposed treatment is consistent with the Commission's actions for both Idaho Power and Avista, which have deferral accounts on which they are allowed to collect interest at the same rate paid by the utility on customer deposits.

Q. On what basis does the Company propose to apply the Net Power Cost Balancing Account balance?

A. Because the Net Power Cost Balancing Account balance is energy related, the Company proposes to apply it through a cents per-kilowatt-hour adjustment (PCAM surcharge or surcredit) based on customers' service voltage levels. The PCAM rates will be calculated by dividing the total Net Power Cost Balancing Account balance by the total kilowatt-hours at the generator for a twelve month test period and then adding an adjustment for voltage level-specific losses. The PCAM will be applied to all customer classes by voltage level and to all energy usage.

Recommendation on Procedure

Q. How does the Company propose to proceed with this case?

A. The Company is requesting a bifurcation of the issues addressed in this case. Specifically, in Track One we request a relatively rapid resolution of the Interim PCAM addressed in my testimony through a typical litigation schedule. We request that a parallel Track Two schedule be adopted that addresses guideline issues in a more extended schedule that relies on a series of technical workshops to resolve as many issues as possible.

1 Q. Does this complete your testimony?

2 A. Yes.